Aviation Safety Investigation Report 199602420

Boeing Co
B737-400

01 August 1996

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NOTE: All air safety occurrences reported to the ATSB are categorised and recorded. For a detailed explanation on Category definitions please refer to the ATSB website at www.atsb.gov.au.

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The Bureau did not conduct an on scene investigation of this occurrence. The information presented below was obtained from information supplied to the Bureau.

Occurrence Number: 199602420 **Occurrence Type:** Incident
Location: 40km S Canberra, Aerodrome
State: ACT **Inv Category:** 4
Date: Thursday 01 August 1996
Time: 1410 hours **Time Zone** EST
Highest Injury Level: None

Aircraft Manufacturer: Boeing Co
Aircraft Model: 737-476
Aircraft Registration: VH-TJX **Serial Number:** 28150
Type of Operation: Air Transport Domestic High Capacity Passenger
Damage to Aircraft: Nil
Departure Point: Sydney NSW
Departure Time: 1348 EST
Destination: Canberra ACT

Approved for Release: Friday, October 18, 1996

The Boeing 737 was being radar vectored to a right base position for a runway 35 Instrument Landing System (ILS) approach. The aircraft was in instrument meteorological conditions and had been cleared to descend to 6,000 ft on a heading of 220 degrees, with an expectation of a right turn to intercept the localiser. When no response was heard from the crew of the B737, following an instruction to turn further right onto the base leg for runway 35, the controller repeated the instruction several times on backup radio equipment. Another aircraft in the area confirmed that all the radio transmissions had been clearly received. During this time, the B737 tracked outside controlled airspace below the minimum radar vectoring altitude. When communications were re-established some two minutes later, the controller issued the crew with an altitude alert and instructed them to climb the aircraft to 7,000 ft. The ILS was re-intercepted from the left, after which an approach and landing was carried out without further incident.

It was later determined that the co-pilot had inadvertently preselected the Canberra ground frequency instead of the relevant tower frequency whilst preparing for the arrival to Canberra. When nothing was heard on the radio for a period longer than expected, and cockpit instruments indicated that the aircraft was approaching the localiser track, the pilot in command became concerned about the position of the aircraft in relation to the surrounding terrain and instructed the co-pilot to transmit, "maintaining six thousand". The reply to this transmission was for the crew to contact Canberra Approach. At this time it became apparent to the crew that the active frequency being monitored was Canberra Ground. Whilst there was no radar altimeter indication or ground proximity warning system alert, the crew commenced terrain avoidance procedures in conjunction with the altitude alert issued by the controller.

As a result of this occurrence the company has produced an article in its flight safety journal to emphasise the ongoing need for situational awareness at all times, and the requirement to pre-brief aspects of the approach, including safety heights and contingency plans, in the event of loss of communications.

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